SPECIAL DATA COLLECTION SYSTEM EVENT REPORT, EASTERN KAZAKH, 20 FEBRUARY 1975

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Teledyne Geotech

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SPECIAL DATA COLLECTION SYSTEM EVENT REPORT
Eastern Kazakh, 20 February 1975

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September 1975

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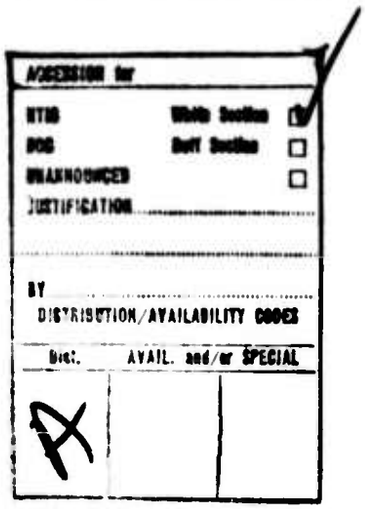

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SDCS Event Report No. 8

Eastern Kazakh, 20 February 1975

This event report contains seismic data from the Special Data Collection System (SDCS), and other sources for the above event. Published epicenter information from seismic observations is:

	Origin Time	Latitude	Longitude	m_b	M_s
NORSAR	05:33:03	50 N	078 E	5.6	N/A
LASA	05:32:58	48.4N	079.6E	5.9	N/A
PDE	05:32:58	49.8N	078.1E	5.7	N/A
Hagfors Array, Sweden	05:33:02	50 N	077 E	6.1	N/A

Using SDCS stations, LASA, TFO, and NORSAR, the epicenter location becomes

SDCS & Arrays	05:33:06	51.0N	077.9E	5.6	N/A

Scaling factors on plots are millimicrons at 1 Hz (not corrected for instrument response) with the exception of LASA and NORSAR short-period plots. LASA SP scaling factors are millimicrons per inch. Scaling factors are not reported for NORSAR short-period.

RK-ON and FN-WV were not operational. There were no calibrations available on the CPSO analog tape covering this event time window, therefore the CPSO magnifications were unobtainable. Calibrator problems at HN-ME precluded accurate determination of short-period magnification levels at that site. LASA, NORSAR and ALPA long-period data were not recovered.

STATION DESCRIPTION

SITE CODE	LOCATION	SITE COORDINATES DEG MN SECS	ELEVATION METERS	INSTRUMENTATION SHORT-PERIOD	LONG-PERIOD
ALPA	Alaska	65 14 00.0 N 147 44 36.0 W	626	None	31300
CPSO	McMinnville, Tennessee	35 35 41.4 N 085 34 13.5 W	574	6480 V 7515 H	SL210 V SL220 H
FN-WV	Franklin, West Virginia	38 32 58.0 N 079 30 47.0 W	910	KS36000	KS36000
LASA	Billings, Montana	46 41 19.0 N 106 13 20.0 W	744	HS10	7505A V 8700C H
HN-ME	Houlton, Maine	46 09 43.0 N 067 59 09.0 W	213	18300	SL210 V SL220 H
NORSAR	Kjeller, Norway	60 49 25.4 N 010 49 56.5 E	379	HS10	7505A V 8700C H
RK-ON	Red Lake, Ontario	50 50 20.0 N 093 40 20.0 W	366	18300	SL210 V SL220 H
WH2YK	White Horse, Yukon	60 41 41.0 N 134 58 02.0 W	853	18300	SL210 V SL220 H

Notes:

Details of the program used to obtain beamed vertical, radial and transverse data at LASA, ALPA and NORSAR are in the process of being reviewed. Vertical beams are probably valid, horizontal beams at the LASA and NORSAR are questionable. Horizontal beams at ALPA are probably invalid.

FN-WV, RK-ON, WH2YK and HN-ME horizontal instruments are oriented radial and transverse to the Nevada Test Site. CPSO is oriented N-S and E-W. LASA, NORSAR and ALPA beams have been rotated to radial and transverse with respect to the event location.

HYPOCENTER DETERMINATION

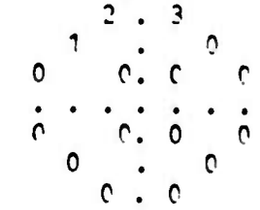
INPUT FOR EVENT 20 FEB 75
05:33:00.0 50.000N 78.000E 0KM.

STA.	ARRIVAL	RESIDUALS CALC	RESIDUALS REST	DIST. REST	AZ. REST
NAO	05 40 18.3	0.0	0.2	37.2	311.8
WH2YK	05 43 50.0	-0.4	-0.4	65.6	17.0
HN-MF	05 45 10.2	0.7	0.3	78.9	336.6
LAO	05 45 30.6	0.4	0.2	82.7	2.8
CPO	05 46 16.8	-1.7	-1.8	92.6	346.5
TFO	05 46 30.2	1.0	1.4	94.8	7.6

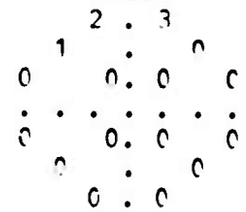
67 HERRIN TRAVEL TIME TABLES

ORIGIN	LAT.	LONG.	DEPTH (KM)	SDV	IT	STA
05:33:32.2	52.163N	77.372E	165. CALC	1.0	8	6
05:33:06.1	50.964N	77.852E	0. REST	1.0	3	6

CALC



REST



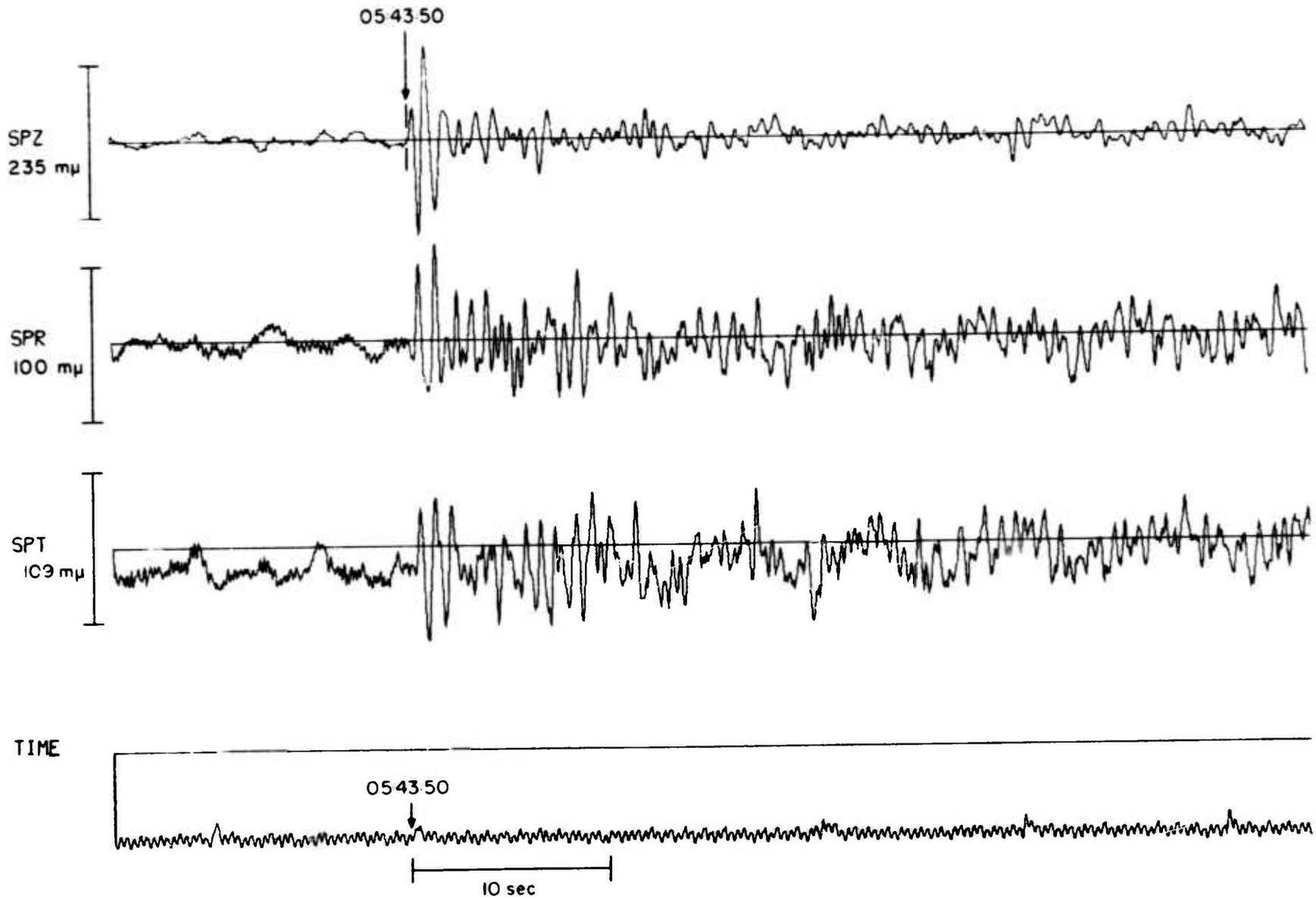
CHI2 COVERAGE ELLIPSE: 95 PER CENT CONF..LEVEL, SDV= 0.94
MAJOR 173.4KM. MINOR 39.2KM. AZ= 1 AREA= 21346 SQ.KM. REST

DATA SUMMARY

INPUT FOR EVENT 20 FEB 75
05:33:00.0 50.000N 78.000E 0KM.

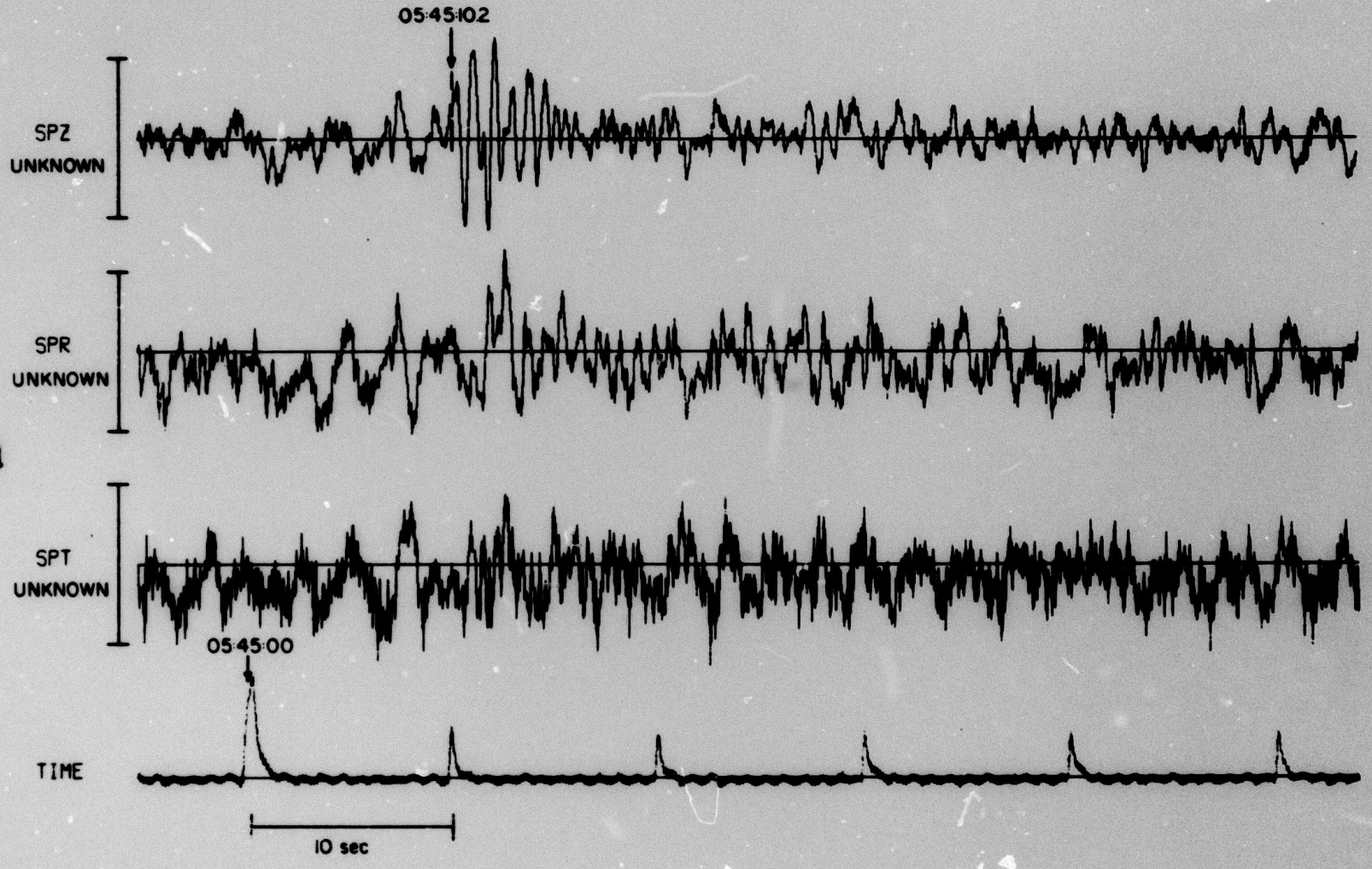
STA.	PHASE	ARRIVAL TIME	INST	PER	A/T	MAGNITUDE MB	MS	DIR	DIST
NAO	EP	05 40 18.3	AB	0.6	117.	5.27			37.2
WH2YK	EP	05 43 50.0	SPZ	0.8	215.	6.03			65.6
HN-ME	EP	05 45 10.2	SPZ	0.6	9999.				
LAO	EP	05 45 30.6	AB	0.9	195.	5.96			82.7
CPO	EP	05 46 16.8	SPZ	1.2	9999.				
TFO	EP	05 46 30.2	SPZ	1.0	25.	5.27			94.9

ORIGIN	LAT.	LONG.	DEPTH (KM)	MAG	SDV	STA
05:33:32.2	52.163N	77.372E	165. CALC	5.37	0.24	4
05:33:06.1	50.964N	77.852E	0. REST	5.63	0.42	4


WH2YK 20 FEB 75
05:43:50
SPZ
235 mμ
SPR
100 mμ
SPT
109 mμ
TIME
05:43:50
10 sec

9.

HN-ME 20 FEB 75



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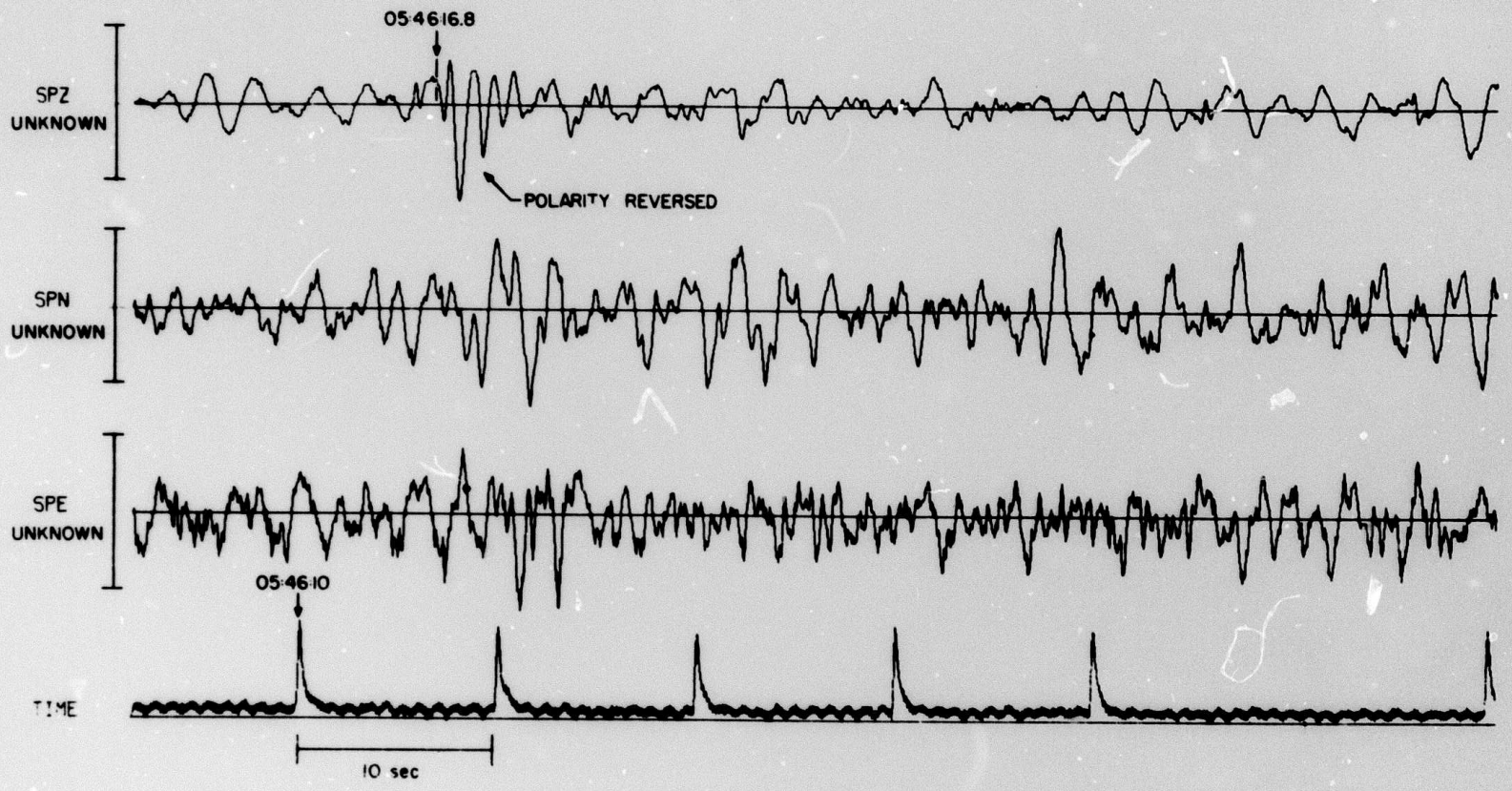

CPSO 20 FEB 75
05:46:16.8
SPZ
UNKNOWN
POLARITY REVERSED
SPN
UNKNOWN
SPE
UNKNOWN
05:46:10
TIME
10 sec

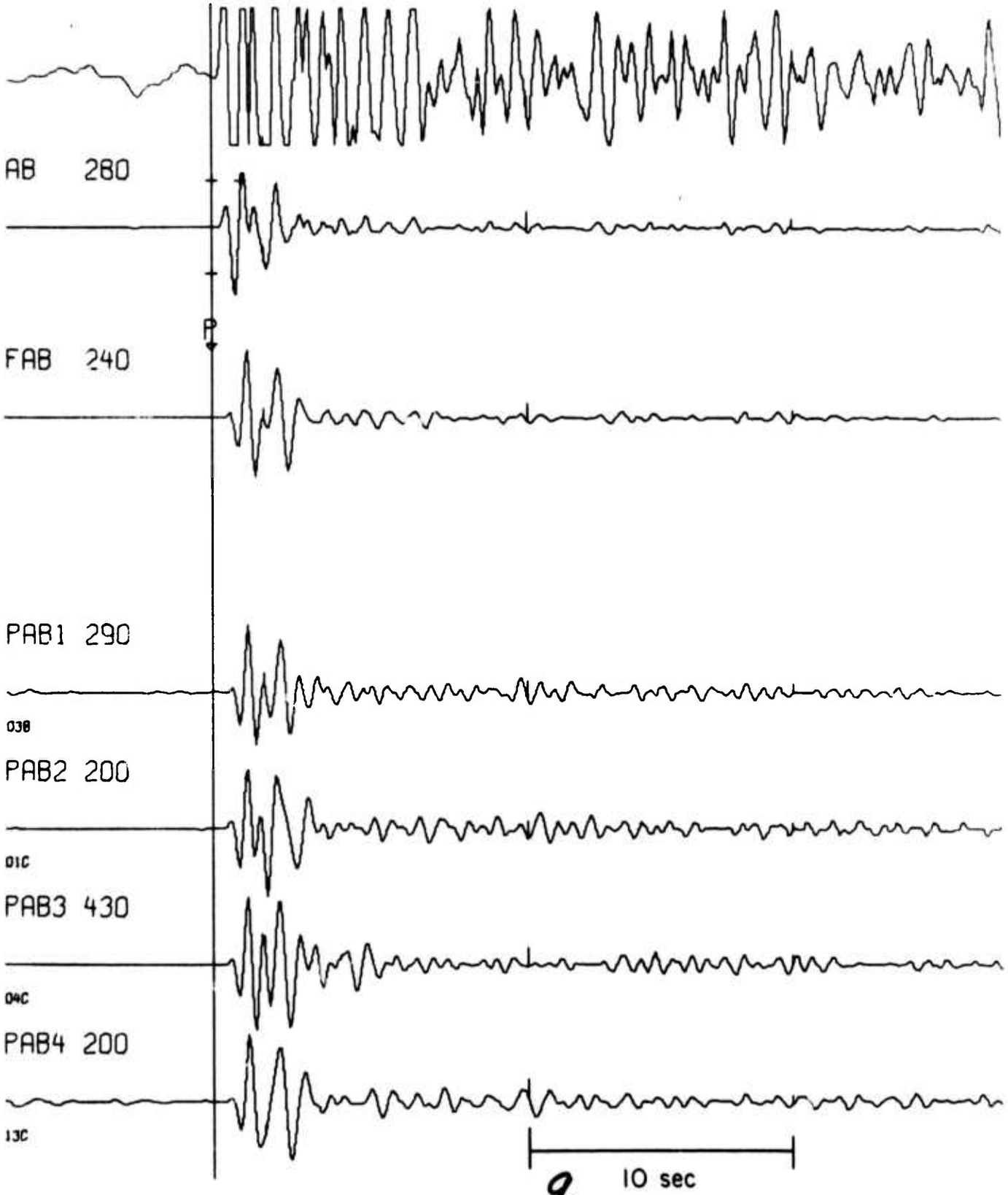
NORSAR

NORSAR SEISMO BULLETIN FOR 20 FEB 1975 (DAY 51/75) FORMAT 5

1 20 FEB 1975
2 5 32 53 49.1N 79.6E 33C B 5.6 329 EASTERN KAZAKH SSR
3 5 40 18.1 01A P 108.8 1.1 13.8 39.3 77.4

EP EXECUTION NO. 29710
ABN 23 NM

BP-B
0.6-2.0 HZ ORDER 3 FILTER



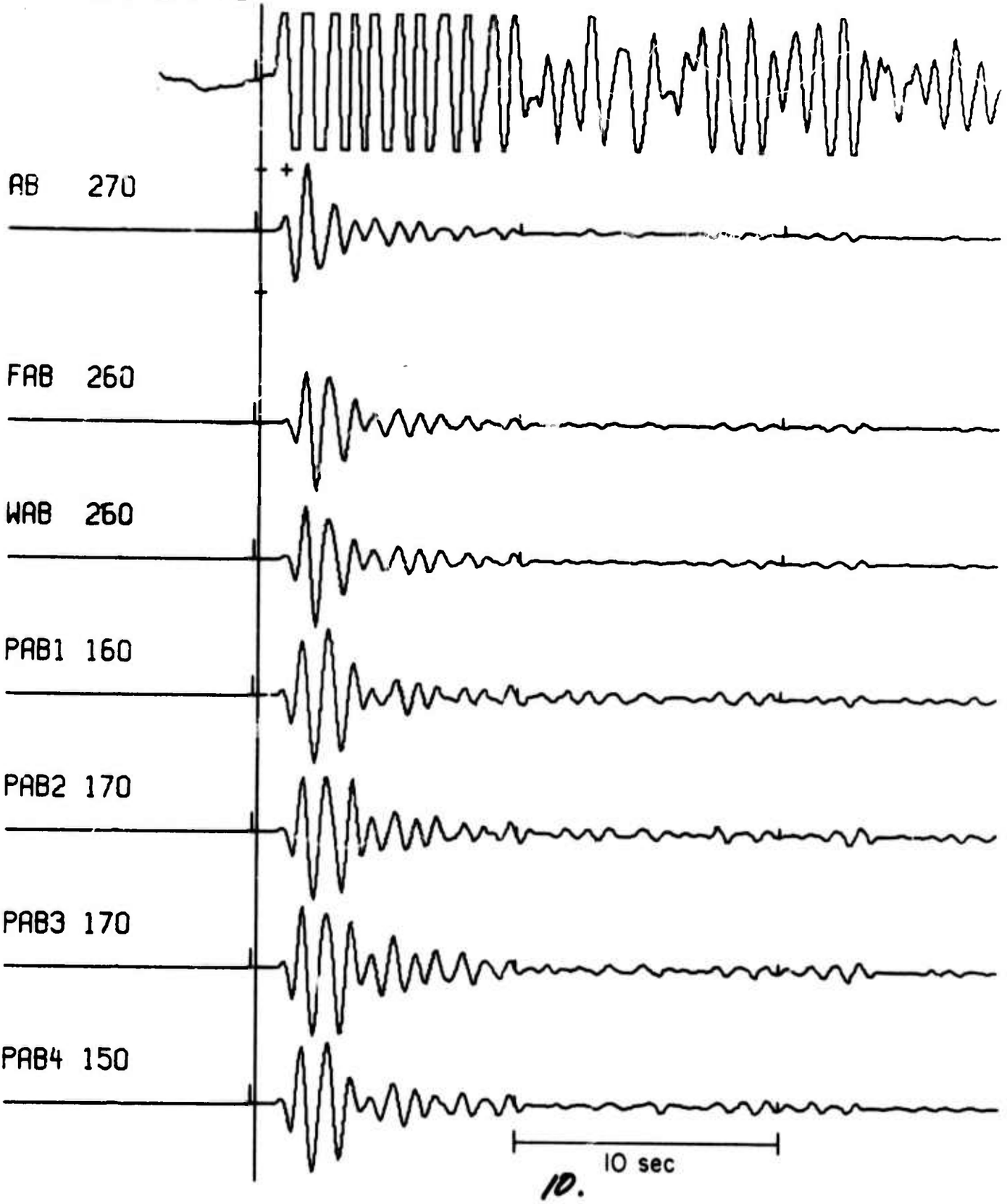
LASA

1 20 FEB 1975
2 5 32 58 48.4N 79.6E 33C C 6.0 329 EASTERN KAZAKH SSR
3 5 45 30.2 LAO P 130.1 1.0 22.5 85.3 356.1

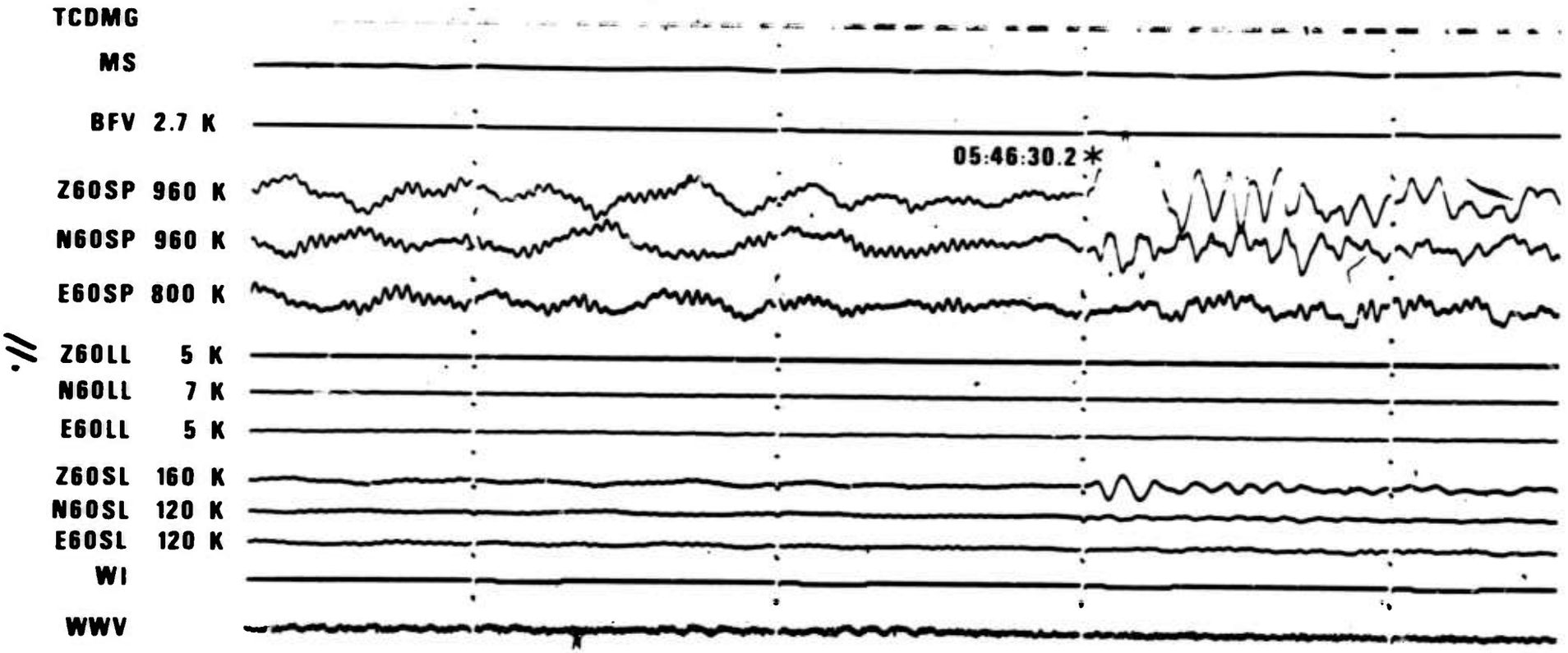
EPX 95535

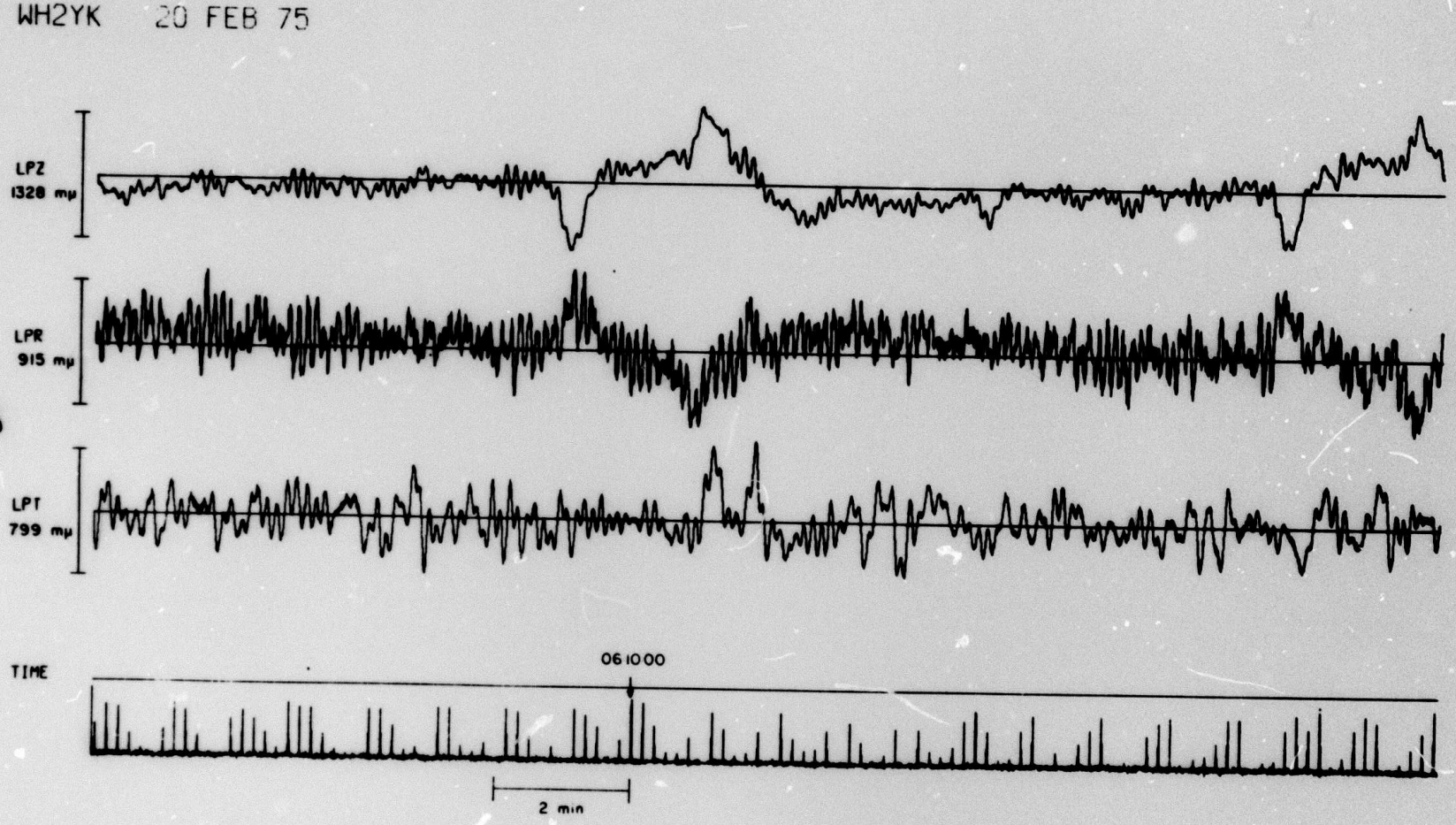
BP-B
0.6-2.0 HZ

ABN 12

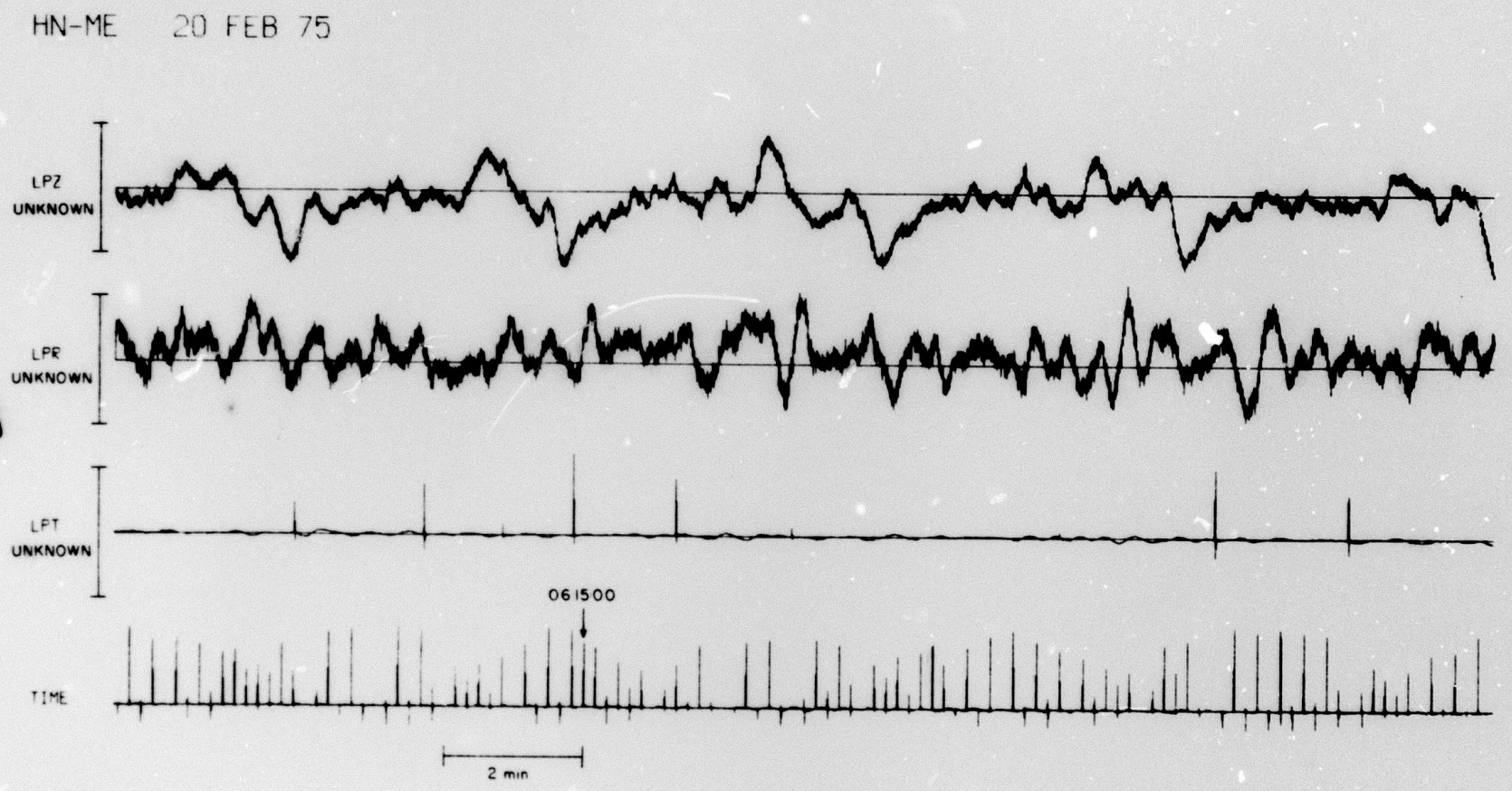


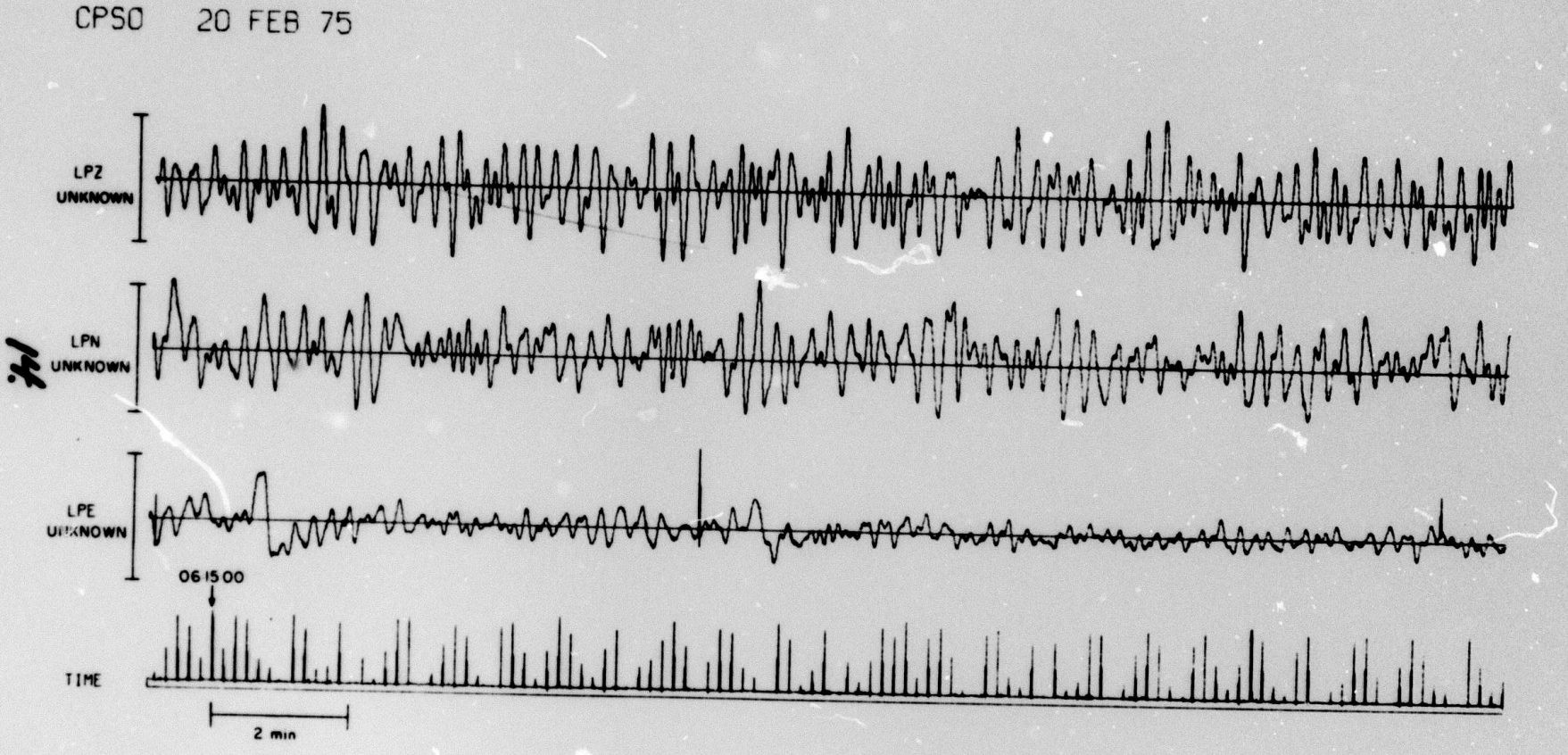
TFSO SHORT PERIOD 20 FEBRUARY 75

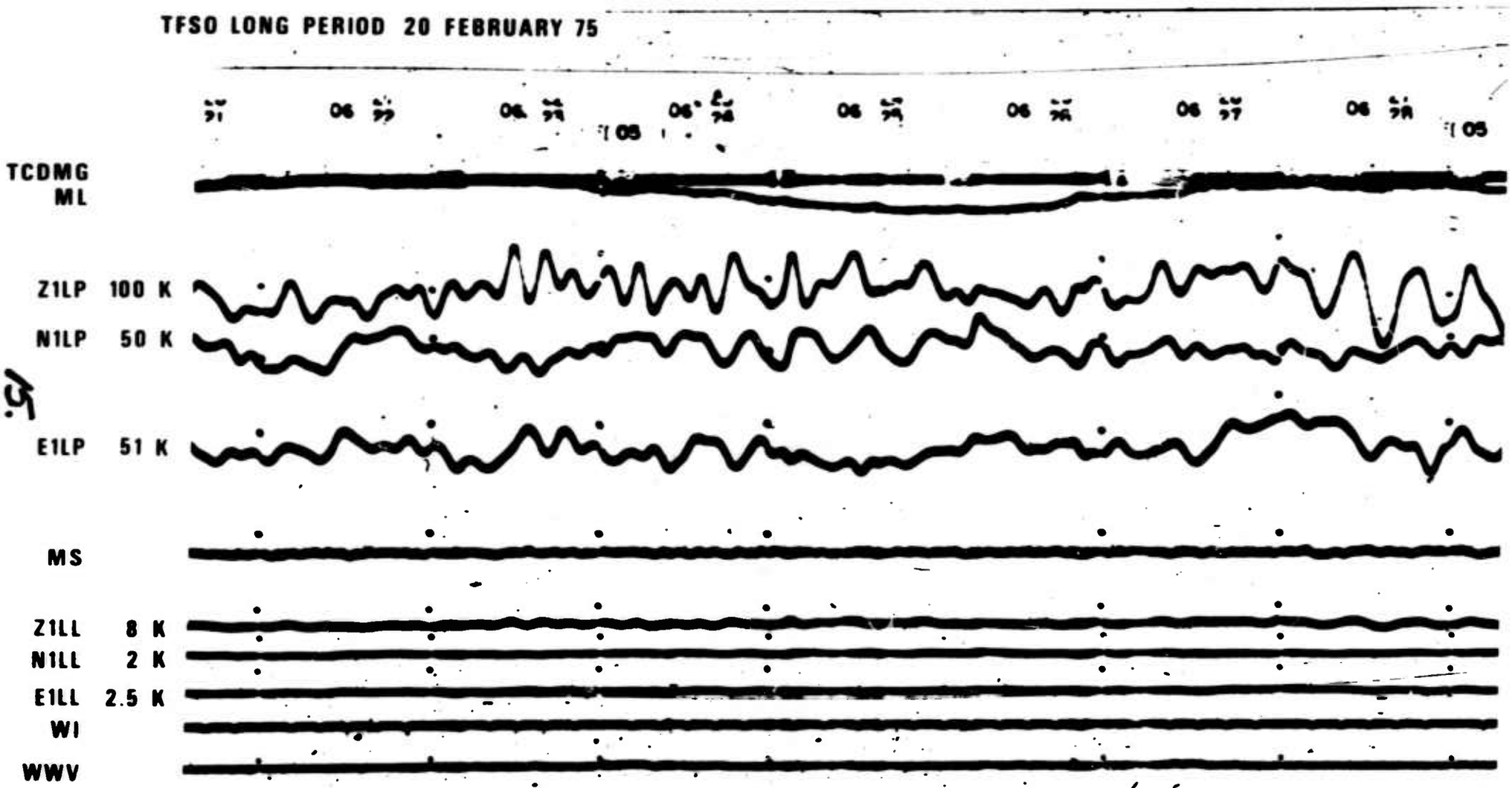



WH2YK 20 FEB 75
LPZ
1328 mμ
LPR
915 mμ
LPT
799 mμ
TIME
061000
2 min

12.


HN-ME 20 FEB 75
LPZ
UNKNOWN
LPR
UNKNOWN
LPT
UNKNOWN
061500
TIME
2 min


CPSO 20 FEB 75
LPZ
UNKNOWN
LPN
UNKNOWN
LPE
UNKNOWN
06 15 00
TIME
2 min


TFSO LONG PERIOD 20 FEBRUARY 75
06
06
06
06
06
06
06
05
05
TCDMG
ML
Z1LP 100 K
N1LP 50 K
E1LP 51 K
MS
Z1LL 8 K
N1LL 2 K
E1LL 2.5 K
WI
WWV